Application Serial No.: 10/031,006 Docket No.: 1093-38 PCT/US

Response to Office Action Mailed on September 15, 2004

IN THE CLAIMS:

1. (Currently Amended) A diffractively and/or refractively operating An optical

apparatus comprising:

a receiver having at least one comprising a solar element, wherein for passing incident

light from a light source, preferably sunlight, is passed on to the solar element, comprising

a transparent or reflective optical body, and

a tracking device for moving the optical body in a tracking direction, which wherein

the tracking device is controlled in dependence on the variation in with respect of to time of

the relative position of the light source and the receiver, preferably in dependence on the

position of the sun,

wherein it is provided that the optical apparatus has a transparent or reflective the

optical body comprises different regions having selected from diffractive regions, and/or

refractive regions and/or and holographic regions, which deflect, and/or concentrate or

deflect and as well concentrate the light,

wherein the optical body is in the form of a foil and/or is on a foil formed as a foil, or

the optical body is attached to a further foil, or the optical body is formed as the foil, which is

attached to the further foil,

wherein the optical body which has a plurality of different portions along the tracking

direction of a different nature in respect of due to the different regions, wherein the different

portions differ by one or more of its optical parameters, along the tracking direction and

wherein the optical body is positioned by which can be caused to track by way of the

tracking device with relative movement with respect to the receiver by rolling up and

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unrolling the foil, wherein the one or more different portions of the optical body can be are brought into and or out of the an operative position by virtue of rolling up and unrolling of the foil and the relative movement of the foil and the solar element, wherein in the operative position the light is passed via the respective one or more different portions of the solar element, and

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wherein the foil co-operates with the solar element in such a way is positioned so that light is passed on to the solar element and that at least one of the regions different portions of the foil which are different in nature along the tracking direction are is associated with at least one the solar element and are of a different nature in such a way that a first of the regions different portion co-operates for a first period of time of one or more days with the solar element and a second region different portion adjacent the first region different portion co-operates for a subsequent second period of time of one or more days with said the solar element.

- 2. (Currently Amended) The apparatus according to claim 1, wherein the foil has different regions portions which can be are associated with the individual days of a year or half-year, preferably 365 or 182 or 183 different regions portions.
- 3. (Currently Amended) The apparatus according to claim 1, wherein a plurality of solar elements are arranged in longitudinal and transverse rows in a grid arrangement and/or and the optical body has a plurality of separate regions which are arranged in longitudinal and transverse rows in a grid arrangement, preferably in a corresponding grid arrangement to the plurality of solar elements.

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4. (Currently Amended) The apparatus according to claim 3, wherein the grid arrangement of the solar elements and/or and the separate regions of the optical body is turned through an acute angle relative to the tracking direction and/or and the direction of movement of the optical body, preferably through an angle of 0.25°, to compensate for the variation in the position of the sun over the year.

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- 5. (Canceled) The apparatus according to claim 1, wherein the foil is dereflected on the side towards the light source.
- 6. (Canceled) The apparatus according to claim 1, wherein the light-concentrating structure is in the form of a concentrator foil having the structure of a diffractive lens or a diffractive mirror.
- 7. (Canceled) The apparatus according to claim 6, wherein the foil has a plurality of different lens structure regions or mirror structure regions which are arranged in succession in the tracking direction.
- 8. (Canceled) The apparatus according to claim 7, wherein tracking is effected preferably to compensate for the change in the position of the sun in respect of the time of day and/or the time of year, and wherein the regions of the foil which are different in nature along the tracking direction are associated with at least one solar element insofar as a first of the regions co-operates for a first period of time of one or more days with the solar element and a second region adjacent the first region co-operates for a subsequent second period of time of one or more days with said solar element.

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9. (Canceled) The apparatus according to claim 8, wherein the foil has different regions which can be associated with the individual days of a year or half-year, preferably 365 or 182 or 183 different regions.

- 10. (Canceled) The apparatus according to claim 8, wherein plurality of solar elements are arranged in a grid arrangement in longitudinal and transverse rows and/or the optical body has a plurality of separate regions which are arranged in longitudinal and transverse rows in a grid arrangement, preferably in a corresponding grid arrangement to the solar elements.
- 11. (Canceled) The apparatus according to claim 10, wherein the grid arrangement of the solar elements and/or the regions of the optical body is turned through an acute angle relative to the tracking direction and/or the direction of movement of the optical body, preferably through an angle of 0.25°, to compensate for the variation in the position of the sun over the year.
- 12. (Canceled) The apparatus according to claim 1, wherein the tracking device has a first, preferably motor transport device which moves the optical body in a first tracking direction, preferably along its main extent, preferably linearly.
- 13. (Canceled) The apparatus according to claim 1, wherein the tracking device has a second, preferably motor transport device which moves the optical body in a second tracking direction in angular relationship with its main extend, preferably linearly,

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and/or with a rotational movement about an axis parallel to the main extent of the optical body.

- 14. (Canceled) The apparatus according to claim 12, wherein the first and/or the second transport device is controlled in dependence on the time of day.
- 15. (Canceled) The apparatus according to claim 13, wherein the first or the second transport device is controlled in dependence on the time of year.
- 16. (Canceled) The apparatus according to claim 12, wherein the optical body is in the form of a flexible foil and the transport device is in the form of a foil transport device having at least one foil storage device for receiving and/or delivering the foil, preferably a drum.
- 17. (Canceled) The apparatus according to claim 16, wherein there is provided a first drum which winds up the foil during the tracking operation and that there is provided a second drum which unwinds the foil during the tracking operation and that a foil portion is arranged preferably tensioned over the solar element between the first and second drums, which foil portion has the portion which is operative with the foil in that position.
- 18. (Currently Amended) The apparatus according to claim 1, wherein the tracking device has a first, preferably motor transport device which moves the optical body in a first tracking direction, preferably along its main extent, preferably linearly.

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19. (Currently Amended) The apparatus according to elaim 1 claim 18, wherein the tracking device has a second, preferably motor transport device which moves the optical body in a second tracking direction in angular relationship with its main extent, preferably linearly, and/or with a rotational movement about an axis parallel to the main extent of the optical body.

- 20. (Currently Amended) The apparatus according to elaim 18 claim 19, wherein the first and/or and second transport device is devices are controlled in dependence on the time of day.
- 21. (Previously Presented) The apparatus according to claim 19, wherein the first or the second transport device is controlled in dependence on the time of year.
- 22. (Currently Amended) The apparatus according to claim 18, wherein the optical body is in the form of a flexible foil and the transport device is in the form of a foil transport device having at least one foil storage device for receiving and/or or delivering the foil, preferably a drum.
- 23. (Currently Amended) The apparatus according to claim 22, wherein there is provided a first drum which winds up the <u>flexible</u> foil during the tracking operation and that there is provided a second drum which unwinds the foil during the tracking operation and that wherein a foil portion of the foil is arranged preferably tensioned in the operative position over the solar element between the first and second drums, which foil portion has the portion which is operative with the foil in that position.

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24. (Currently Amended) The apparatus according to claim 1, wherein the different portions are arranged on and/or in the optical body in mutually juxtaposed relationship in the tracking direction, wherein the portions are in the form of portions which blend continuously into each other or in the form of are separate discrete portions.

- 25. (Currently Amended) The apparatus according to claim 1, wherein the optical body is in the form of a rigid or flexible body.
- 26. (Currently Amended) The apparatus according to claim 1, wherein the optical body or the foil has at least one layered <u>different</u> region with a structure which deflects, and/or concentrates or deflects and as well concentrates the light.
- 27. (Previously Presented) The apparatus according to claim 1, wherein the foil is de-reflected on the side towards the light source.
- 28. (Currently Amended) The apparatus according to elaim 1 claim 26, wherein the light-concentrating structure is in the form of a concentrator foil having the structure of provided by a diffractive lens or a diffractive mirror.
- 29. (Previously Presented) The apparatus according to claim 28, wherein the foil has a plurality of different lens structure regions or mirror structure regions which are arranged in succession in the tracking direction.